

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (original) A process for repairing at least one crack in a metal workpiece comprising the steps of:

forming a braze paste containing a first nickel base alloy material containing boron and chromium and a second nickel base alloy material containing chromium and cobalt;

applying said brazing paste to an area of said metal workpiece containing said at least one crack; and

subjecting said brazing paste and said workpiece to a brazing cycle by heating said brazing paste and said workpiece.

2. (original) A process according to claim 1, wherein said heating step comprises heating said brazing paste and said workpiece to a temperature in the range of 2000 degrees Fahrenheit to 2200 degrees Fahrenheit.

3. (original) A process according to claim 1, wherein said braze paste forming step providing said first and second nickel base alloy materials in powder form and mechanically mixing said first and second nickel base alloy materials.

4. (original) A process according to claim 1, further comprising prefilling said at least one crack with said second nickel base alloy material.

5. (original) A process according to claim 1, wherein said braze paste forming step comprises forming a paste containing from 20 wt% to 60 wt% of the first nickel base alloy material and the balance comprising said second nickel base alloy material.

6. (original) A process according to claim 5, wherein said braze paste forming step comprises forming a braze paste with a 1:1 ratio of said first nickel base alloy material to said second nickel base alloy material.

7. (original) A process according to claim 1, wherein said braze paste forming step comprises mixing a first nickel base alloy material containing nickel as a major constituent and from 14 wt% to 16 wt% chromium and from 2.4 wt% to 3.0 wt% boron and a second nickel base alloy material containing from 45 wt% nickel to 51 wt% nickel, from 22 wt% to 23 wt% chromium, and from 18.5 wt% to 19.5 wt% cobalt.

8 - 12. (cancelled)

13. (original) A process for repairing at least one crack in a turbine engine component comprising the steps of:

forming a braze paste containing a first nickel base alloy material containing boron and chromium and a second nickel base alloy material containing chromium and cobalt;

applying said brazing paste to an area of said turbine engine component containing said at least one crack; and

heating said brazing paste and said turbine engine component to cause said braze paste to flow into and fill said at least one crack.

14. (original) A process according to claim 13, wherein said heating step comprises heating said brazing paste and said turbine engine component to a temperature in the range of from 2000 degrees Fahrenheit to 2200 degrees Fahrenheit.

15. (original) A process according to claim 13, wherein said braze paste forming step providing said first and second nickel base alloy materials in powder form and mechanically mixing said first and second nickel base alloy materials.

16. (original) A process according to claim 13, further comprising prefilling said at least one crack in said turbine engine component with said second nickel base alloy material.

17. (original) A process according to claim 13, wherein said braze paste forming step comprises forming a paste containing from 20 wt% to 60 wt% of the first nickel base alloy material and the balance comprising said second nickel base alloy material.

18. (original) A process according to claim 17, wherein said braze paste forming step comprises forming a braze paste with a 1:1 ratio of said first nickel base alloy material to said second nickel base alloy material.

19. (original) A process according to claim 13, wherein said braze paste forming step comprises mixing a first nickel base

alloy material containing nickel as a major constituent and from 14 wt% to 16 wt% chromium and from 2.4 wt% to 3.0 wt% boron and a second nickel base alloy material containing from 45 wt% nickel to 51 wt% nickel, from 22 wt% to 23 wt% chromium, and from 18.5 wt% to 19.5 wt% cobalt.

20. (currently amended) A process ~~according to claim 1~~, for repairing at least one crack in a metal workpiece comprising the steps of:

forming a braze paste containing a first nickel base alloy material containing boron and chromium and a second nickel base alloy material containing chromium and cobalt;

applying said brazing paste to an area of said metal workpiece containing said at least one crack;

subjecting said brazing paste and said workpiece to a brazing cycle by heating said brazing paste and said workpiece;
and

wherein said braze paste forming step comprises mixing a first nickel base alloy material consisting from 14 wt% to 16 wt% chromium, from 2.4 wt% to 3.0 wt% boron, up to 0.15 wt% total other elements, and the remainder nickel and inevitable impurities and a second nickel base alloy material consisting of from 22 wt% to 23 wt% chromium, from 18.5 wt% to 19.5 wt% cobalt, from 3.5 to 4.0 wt% titanium, from 1.8 wt% to 2.2 wt% tungsten, from 1.7 wt% to 2.0 wt% aluminum, from 1.2 wt% to 1.5 wt% tantalum, from 0.8 wt% to 1.2 wt% niobium, from 0.13 wt% to 0.17 wt% carbon, up to 0.2 wt% manganese, up to 0.015 wt%

phosphorous, up to 0.10 wt% copper, up to 0.25 wt% iron, up to 0.10 wt% silicon, up to 0.04 wt% zirconium, from 0.001 wt% to 0.008 wt% boron, up to 0.005 wt% sulfur, up to 0.005 wt% nitrogen, up to 0.003 wt% oxygen, up to 0.0005 wt% silver, up to 0.0005 wt% lead, up to 0.00005 wt% selenium, up to 0.00003 wt% bismuth, up to 0.00005 wt% tellurium, up to 0.00005 wt% thallium, and the balance nickel and inevitable impurities.

21. (currently amended) A process ~~according to claim 1~~, for repairing at least one crack in a metal workpiece comprising the steps of:

forming a braze paste containing a first nickel base alloy material containing boron and chromium and a second nickel base alloy material containing chromium and cobalt;

applying said brazing paste to an area of said metal workpiece containing said at least one crack;

subjecting said brazing paste and said workpiece to a brazing cycle by heating said brazing paste and said workpiece;
and

wherein said braze paste forming step comprises mixing a first nickel base alloy material consisting from 14 wt% to 16 wt% chromium, from 2.4 wt% to 3.0 wt% boron, up to 0.15 wt% total other elements, and the remainder nickel and inevitable impurities and a second nickel base alloy material consisting of from 22 wt% to 23 wt% chromium, from 18.5 wt% to 19.5 wt% cobalt, from 3.5 to 4.0 wt% titanium, from 1.8 wt% to 2.2 wt% tungsten, from 1.7 wt% to 2.0 wt% aluminum, from 1.2 wt% to 1.5

wt% tantalum, from 0.8 wt% to 1.2 wt% niobium, from 0.13 wt% to 0.17 wt% carbon, and the balance nickel and inevitable impurities.